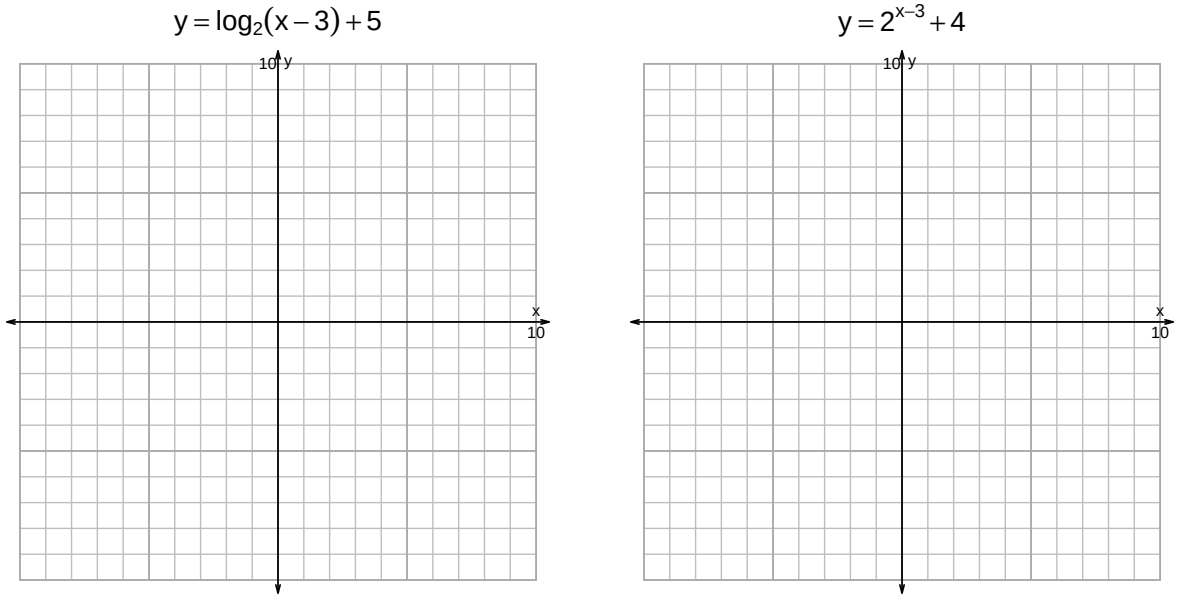
Name: Date:

s18quiz: EXP LOG (Practice v105)

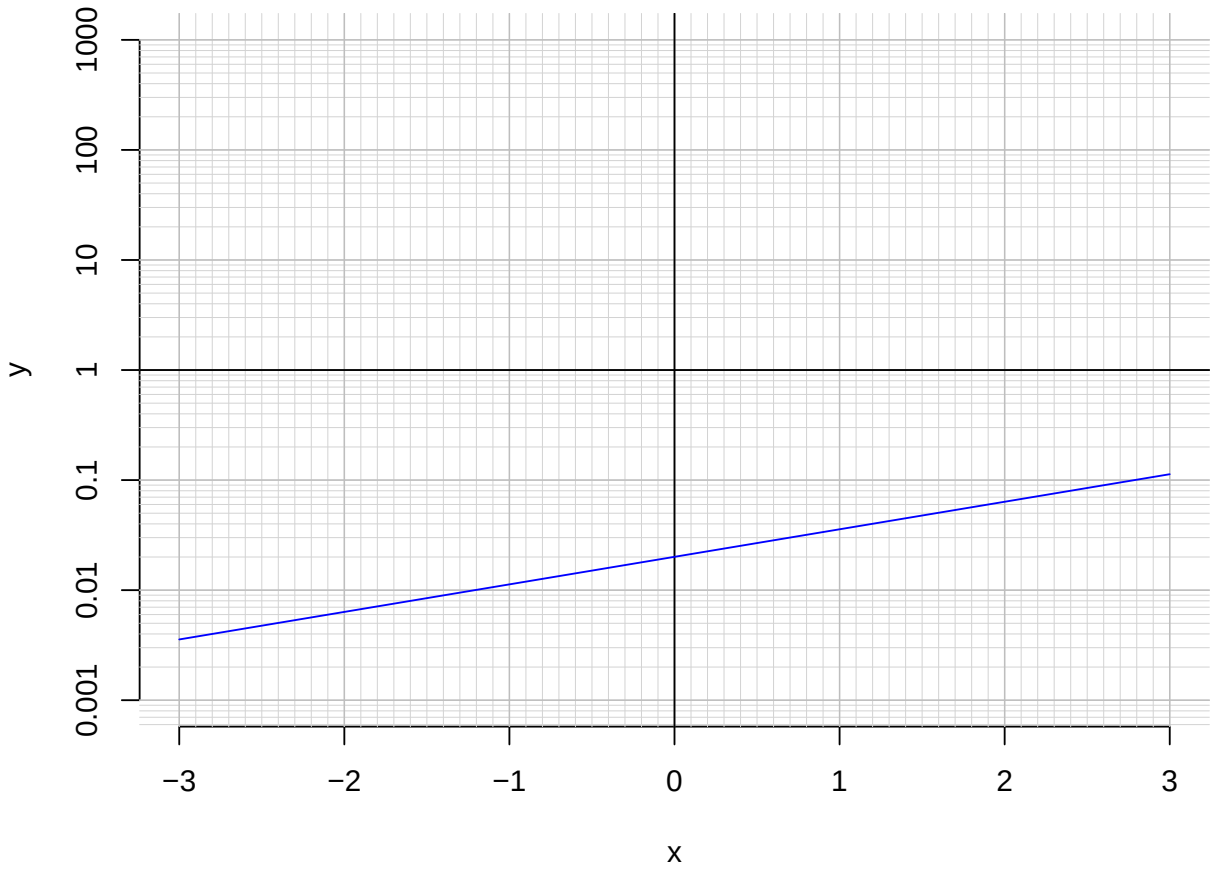
1. Graph $y = \log_2(x-3)+5$ and $y = 2^{x-3}+4$ on the grids below. Also, draw any asymptotes with dotted lines.



2. Write (but do not evaluate) the solution to the equation below by writing a logarithmic expression.

$$-29 = \left(\frac{-4}{5}\right) \cdot 2^{7t/3}$$

3. An exponential function $f(x) = 0.0201 \cdot e^{0.576x}$ is graphed below on a semi-log plot.



a. Using the plot above, evaluate $f(1.9)$.

b. Express $f^{-1}(x)$, the inverse of f.

c. Using the plot above, evaluate $f^{-1}(0.004)$.